



IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Appellants:

Jay S. Walker, Daniel E. Tedesco, John M.
Packes Jr., Charles A. Rattner, Magdalena
Mik

Application No.: 09/218,085

Filed: December 22, 1998

For: METHOD AND APPARATUS FOR
VENDING PRODUCTS

) Group Art Unit: 3624

) Examiner: S. Wasylchak

) APPEAL BRIEF

) Attorney Docket No. 98-038

) Customer No. 22927

RECEIVED
DEC 15 2003

GROUP 3600

CERTIFICATE OF MAILING BY "EXPRESS MAIL"

I hereby certify that this correspondence is being deposited with
the United States Postal Service "Express Mail under Express
Mail No. 985253736US" under CFR 1.10 in an envelope
addressed to: Commissioner for Patents, P. O. Box 1450
Alexandria, VA 22313-1450, on December 8, 2003.

Dated: December 8, 2003 By:

Veronika S. Leliever

BOARD OF PATENT APPEALS
AND INTERFERENCES

Mail Stop: Appeal Brief
Commissioner for Patents
P. O. Box 1450
Alexandria, VA 22313-1450

Appellants hereby appeal to the Board of Patent Appeals and Interferences from the
decision of the Examiner in the Office Action mailed November 1, 2002, rejecting claims 1 - 50
and 52.

TABLE OF CONTENTS

REAL PARTY IN INTEREST	3
RELATED APPEALS AND INTERFERENCES	3
STATUS OF CLAIMS	3
STATUS OF AMENDMENTS	3
SUMMARY OF INVENTION.....	4
ISSUES.....	4
GROUPING OF CLAIMS	5
ARGUMENT.....	5
Summary of Arguments	5
The References.....	6
1. Group I.....	9
1.1. Independent Claims.....	9
1.2. Advantages of the Independent Claims.....	10
1.3. No Prima Facie Showing of Obviousness of the Claims of Group I	10
1.3.1. No showing that the references suggest outputting an offer of a product which is selected from among the plurality of products based on the monetary value and the minimum acceptable price data.....	12
1.3.2. No showing of a motivation to combine the references.....	13
1.3.3. Level of Skill.....	15
1.4. No Prima Facie Showing of Indefiniteness of the Claims of Group I	16
2. Group II.....	19
2.1. No Substantial Evidence of the Limitation of Dependent Claim 10.....	19
3. Group III.....	20
3.1. No Substantial Evidence of the Limitation of Dependent Claim 11.....	20
4. Group IV	22
4.1. No Substantial Evidence of the Limitation of Dependent Claim 17.....	22
5. Group V	24
5.1. No Substantial Evidence of the Limitation of Dependent Claim 18.....	24
APPENDIX A: CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL	
APPENDIX B: CHART SHOWING CLAIM DEPENDENCIES	

REAL PARTY IN INTEREST

The present application is assigned to Walker Digital, LLC, 1177 High Ridge Road, Stamford, CT 06905.

RELATED APPEALS AND INTERFERENCES

Appellants are not aware of any appeals which might be considered to directly affect, be directly affected by or have a bearing on the Board's decision in the pending appeal.

STATUS OF CLAIMS

Claims 1 - 50 and 52 are pending in the present application and are being appealed.

Claims **1 - 50 and 52** stand rejected under 35 U.S.C. § 112, ¶ 2 as being indefinite.

Claims **1 – 12, 14 - 50 and 52** stand rejected under 35 U.S.C. § 103(a) as being unpatentable over a combination of:

- U.S. Patent No. 5,997,236 to Picioccio; and
- Pages 446 and 532 of "Economics", 8th Ed., 1970, by Paul A. Samuelson, McGraw-Hill Book Company ("Samuelson").

Claim **13** stands rejected under 35 U.S.C. § 103(a) as being unpatentable over a combination of Picioccio, Samuelson, and the abstract of Japanese patent publication number 09198554 to Koga (Japanese patent application no. 08006947).

STATUS OF AMENDMENTS

No amendments were filed subsequent to final rejection.

SUMMARY OF INVENTION

Generally, according to one aspect of the invention, a product is selected from among products to be sold by a vending machine. Present Application, Summary of the Invention, page 5, lines 23 - 24. The product is selected based on, among other things, the minimum acceptable price associated with the product. Present Application, Summary of the Invention, page 5, line 23 - page 6, line 1.

An offer of the product is output to a consumer via an output device, without revealing the identity of the selected product. If the consumer accepts the offer, the product is dispensed, thereby revealing the identity of the product to the consumer. Present Application, Summary of the Invention, page 6, lines 1 - 5.

ISSUES

Whether claims **1 - 50 and 52** are unpatentable under 35 U.S.C. § 112, ¶ 2 as being indefinite.

Whether claims **1 - 12, 14 - 50 and 52** are unpatentable under 35 U.S.C. § 103(a) as being obvious in light of a combination of Picioccio and Samuelson.

Whether claim **13** is unpatentable under 35 U.S.C. § 103(a) as being obvious in light of a combination of Picioccio, Samuelson and Koga.

GROUPING OF CLAIMS

The claims in different groups do not stand and fall together.

Appellants group the pending claims as follows:

Group I - claims 1 - 9, 12 - 16, 19 - 50 and 52

Group II- claim 10

Group III - claim 11

Group IV - claim 17

Group V - claim 18

Appellants believe that claims in different groups are separately patentable, as explained below.

ARGUMENT

Summary of Argument

The rejections fail for two primary reasons: the Examiner has not made a prima facie case of obviousness, and in any event the references could not support a showing of obviousness.

First, the references under any reasonable interpretation completely fail to suggest several limitations that are recited in the independent claims.

Among other failings, the references completely lack any hint of the following feature present in all claims:

- *outputting an offer of a product which is*
- *selected from among the plurality of products based on the monetary value and the minimum acceptable price data*

The Examiner incorrectly contends that this feature is obvious in view of a combination of:

- A vending machine that dispenses a random mix of products which are not selling well or which are nearly empty

AND

- The general economic principle that zero profits result when the price of a product equals its marginal cost.

Accordingly, the rejections are inappropriate and Appellants respectfully request that the rejections be reversed.

Form of this Appeal Brief

In the arguments herein, limitations of the claims are indicated in *italics*, and the references of record are indicated by underlining.

In separate arguments of patentability of different Groups, Appellants have, where possible, referred to prior arguments to avoid undue repetition.

In the arguments below, Appellants refer to:

Appellants' First Response (Amendment and Response mailed April 17, 2001); and

Appellants' Second Response (Amendment and Response mailed January 28, 2002); and

the "Third Office Action" (Office Action mailed November 1, 2002).

The References

Discussed immediately below are the references used in rejecting all appealed claims: Picioccio, Samuelson and Koga.

Picioccio

In general, Picioccio discloses a vending machine in which customers can choose a blend of product to be purchased and dispensed. Abstract. For example, the machine may allow various blends of different colored M & M's™ chocolate candies. Col. 9, lines 30 - 51; Col. 10, lines 1 - 34 . The customer may choose to have dispensed a random mix selected by the machine. Col. 9, lines 52 - 67. This random mix may be selected from those products which are not selling well. Col. 9, lines 56 - 61. Alternatively, this random mix may be selected from the most popular bins that are nearly empty just prior to a regularly scheduled refill visit by a vending operator or stocker. Col. 9, lines 64 - 67.

Koga

Koga is a single paragraph abstract translated from Japanese. As best as can be understood from this translation, Koga discloses a vending machine in which products are cooked together and preserved before sale. With the start of preservation, a counter starts counting elapsed time. The price of the product is reduced by a prescribed amount corresponding to the elapsed time. Thus, products closer to expiration time may be purchased at a lower price.

Samuelson

Samuelson includes two apparently disparate pages taken out of context from an economics text book. As best as can be understood, these two pages describe several theoretical economics principles. Page 446 describes that a break-even point occurs where AC is at its minimum, and also that

$$P = MC = \text{Minimum AC},$$

in a theoretical situation of long-run equilibrium of zero excess-profits.

Page 532 describes that the Maximum-profit condition that $MR = MC$, which implies that a firm "shall stop hiring more of a factor only at the point where the marginal-revenue product it brings just matches its market price".

Other Subject Matter Without Support in the Record is not Substantial Evidence

The Examiner has based several rejections on subject matter which is alleged to be well known. No evidence of any kind has been provided for these allegations. Appellants have already disputed various assertions regarding what is 'well known' but unsupported by the record. Appellants' First Response, pages 9 - 10. Appellants' Second Response, pages 3 - 4.

Appellants note that the scope of the matter of which the Examiner takes Official Notice is limited to the substantial evidence in the record for such matter. The references of record clearly do not support the Examiner's broad assertions as to what was well known.

Accordingly, the Examiner's sweeping assertions which are not supported by the references of record lack substantial evidence, and therefore cannot be used as prior art to the present application. Only the content of the references of record which are prior art to the present application may so used. "[D]eficiencies of the cited references cannot be remedied by the Board's general conclusions about what is 'basic knowledge' or 'common sense.'" In re Zurko,

258 F.3d 1379, 1385, 59 USPQ2d 1693, 1697 (Fed. Cir. 2001); In re Lee, 277 F.3d 1338, 1344, 61 USPQ2d 1430, 1434 (Fed. Cir. 2002).

The rejections which are based on "Official Notice" are discussed below.

1. Group I

Group I includes all independent claims (claims **1, 16, 19, 31, 34, 46, 49, 50 and 52**), and dependent claims **2 - 15, 17 - 18, 20 - 30, 32, 33, 35 - 45, 47, and 48**.

As discussed below, the rejection of the claims of Group I is flawed because the Examiner has not made a prima facie case of unpatentability of any claim of Group I. The Examiner has not shown all limitations of any claim to be disclosed or suggested by the references. The rejection is also based on improper combinations and modifications of the references without adequate motivation in the prior art for making the proposed combinations and modifications.

Further, no claim of Group I can be deemed obvious in light of the references of record, alone or in any combination, because the cited references, alone or in any combination, cannot be interpreted in a manner that would disclose or suggest the limitations of any pending claim. Further, the prior art of record does not contain any proper motivation to combine or modify the references in any way which renders any claim of Group I obvious.

Although in the arguments below reference is made to claim **1** the arguments are likewise applicable to the remaining claims in this Group.

1.1. Independent Claims

Every independent claim (independent claims **1, 16, 19, 31, 34, 46, 49, 50 and 52**) includes the following feature:

- *outputting an offer of a product which is*
- *selected from among the plurality of products based on a monetary value and minimum acceptable price data*

In different claims, the *monetary value* of this feature is either:

- a monetary value *available for purchasing a product* (independent claims **1, 19, 34, 49**)
- OR

Group I

- the *difference between* a first monetary value received from a consumer and *the price of the first product* (independent claims 16, 31, 46, 50, 52)

1.2. Advantages of the Independent Claims

The embodiments of the independent claims provide several advantages not even recognized, much less disclosed or suggested, by the prior art of record, either alone or in combination. These advantages render the claimed subject matter nonobvious over the cited art.

As discussed in the present application, by *outputting an offer of a product* which is *selected from among the plurality of products based on a monetary value and minimum acceptable price data*, the product offered can be sold for any of a number of prices which are attractive to the consumer in various ways.

Since the product to be offered is selected *based on minimum acceptable price data*, the price of the product can be, e.g., as low as would still be "acceptable" to the seller (e.g., the wholesale price). Present Application, page 12, lines 18 - 19.

Since the product to be offered is also selected *based on a monetary value* (i.e. monetary value *available for purchasing a product* or a *difference between* a first monetary value received from a consumer and *the price of the first product*), the price of the product can be one which the customer would more readily pay, e.g., the amount of change owed to a consumer. Present Application, page 14, lines 1 - 3. this would make the offer highly attractive.

A great many more advantageous and diverse uses of the claimed invention, both explicit and implicit in the present Application, are possible and would be apparent to those of skill in the art based on the Appellants' disclosure.

1.3. No Prima Facie Showing of Obviousness of the Claims of Group I

A reading of the rejections of the claims of the Group reveals that the Examiner has consistently ignored or misinterpreted the limitations of the claims. Several limitations are not disclosed or suggested by the references of record. Accordingly, the Examiner has not presented a prima facie case of obviousness of any claim of the Group.

Group I

Applicable Law

The Examiner bears the burden of establishing a *prima facie* case of obviousness based upon the prior art. *In re Fritch*, 972 F.2d 1260, 1265 (Fed. Cir. 1992). To reject claims in an application under section 103, an examiner must show an un rebutted *prima facie* case of obviousness. *In re Rouffet*, 149 F.3d 1350, 1355 (Fed. Cir. 1998). If examination at the initial stage does not produce a *prima facie* case of unpatentability, then without more the applicant is entitled to grant of the patent. *In re Oetiker*, 977 F.2d 1443, 1445 (Fed. Cir. 1992).

The factual predicates underlying an obviousness determination include the scope and content of the prior art, the differences between the prior art and the claimed invention, and the level of ordinary skill in the art. *In re Rouffet*, 149 F.3d 1350, 1355 (Fed. Cir. 1998). The secondary considerations are also essential components of the obviousness determination. *In re Rouffet*, 149 F.3d 1350, 1355 (Fed. Cir. 1998).

In order to rely on a reference as a basis for rejection of the applicant's invention, the reference must either be in the field of the applicant's endeavor or, if not, then be reasonably pertinent to the particular problem with which the inventor was concerned. *In re Oetiker*, 977 F.2d 1443, 1447 (Fed. Cir. 1992).

When a rejection is based on a combination of references, the Examiner can satisfy the *prima facie* burden only by showing some objective teaching leading to the purported combination of references. *In re Fritch*, 972 F.2d 1260, 1265 (Fed. Cir. 1992). Lacking a motivation to combine references, there is no *prima facie* case of obviousness. *In re Rouffet*, 149 F.3d 1350, 1358 (Fed. Cir. 1998).

In a determination of obviousness, factual findings as to scope and content of the prior art, level of ordinary skill in the art, differences between the claimed invention and the prior art, and secondary considerations of nonobviousness must be supported by substantial evidence. *Novamedix Distrib. Ltd. v. Dickinson*, 175 F. Supp. 2d 8, 9 (D.D.C. 2001).

Officially-noted subject matter cannot be used as the basis for a rejection under Section 103. Official Notice may be used, if at all, only to clarify the meaning of a reference. See, e.g., *In re Ahlert*, 424 F.2d 1088 (C.C.P.A. 1969) ("Typically, it is found necessary to take notice of facts which may be used to supplement or clarify the teaching of a reference disclosure, perhaps to justify or explain a particular inference to be drawn from the reference teaching.") (emphasis added).

Group I

In other words, official notice of what existed in the prior art is not permitted. A reference must be provided to show the scope and content of the prior art. See, e.g., *In re Ahlert*, 424 F.2d 1088 (C.C.P.A. 1969) ("Assertions of technical facts in areas of esoteric technology must always be supported by citation to some reference work recognized as standard in the pertinent art and the appellant given, in the Patent Office, the opportunity to challenge the correctness of the assertion or the notoriety or repute of the cited reference. ... Allegations concerning specific 'knowledge' of the prior art, which might be peculiar to a particular art should also be supported and the appellant similarly given the opportunity to make a challenge.") (emphasis added); *In re Eynde*, 480 F.2d 1364 (C.C.P.A. 1973) ("[W]e reject the notion that judicial or administrative notice may be taken of the state of the art. Facts constituting the state of the art in a patent case are normally subject to the possibility of rational disagreement among reasonable men, and are not amenable to the taking of judicial or administrative notice.") (emphasis added); *In re Pardo*, 684 F.2d 912 (C.C.P.A. 1982) ("[T]his court will always construe [the rule permitting judicial notice] narrowly and will regard facts found in such manner with an eye toward narrowing the scope of any conclusions to be drawn therefrom. Assertions of technical facts in areas of esoteric technology must always be supported by citation to some reference work recognized as standard in the pertinent art.") (emphasis added)

1.3.1. No showing that the references suggest *outputting an offer of a product which is selected from among the plurality of products based on the monetary value and the minimum acceptable price data*

The Examiner has not shown that the references, alone or in combination, *outputting an offer of a product which is selected from among the plurality of products based on the monetary value and the minimum acceptable price data*.

Proposed Factual Findings

The Examiner admits that *Picioccio* does not disclose that there is *minimum acceptable price data* for products. *Third Office Action*, page 3, paragraphs (a) and (c).

The Examiner asserts that "both normal price data and minimum acceptable price data for each of a plurality of products is well known". *Third Office Action*, page 3, paragraphs (a) and (c). Applicants requested support for this and other assertions. *Appellants' First Response*, pages *Group I*

9 - 10. Appellants' Second Response, pages 3 - 4. However, no support for the assertions was provided.

These Findings Have No Support in the Record

There is no evidence in the record that any reference or combination of references would suggest *outputting an offer of a product which is selected from among the plurality of products based on a monetary value and minimum acceptable price data*. More generally, despite the Examiner's allegation regarding what was well known, there is no evidence that, prior to the invention by Appellants, it was well known to do anything with the minimum acceptable price data, much less *maintaining a database of product data, including normal price data and minimum acceptable price data for each of a plurality of products*. Since the Examiner has refused to provide evidence of this feature, and the rejection of every claim in this Group is based on this "official notice", no prima facie case of obviousness has been made for any claim in this Group.

1.3.2. No showing of a motivation to combine the references

The rejection of each independent claim in the Group (and thus of every dependent claim as well) requires both a modification of a reference, and then a combination of modified teachings. The Examiner simply has not shown a motivation in the prior art of record to modify or combine references in the manner proposed by the Examiner, or in any other manner that renders the claims obvious.

Applicable Law

Obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. *In re Fine*, 5 USPQ2d 1596 (Fed. Cir. 1988); *In re Jones*, 21 USPQ2d 1941 (Fed. Cir. 1992). Furthermore, **particular findings must be made** as to the reason the skilled artisan, with no knowledge of the claimed invention, would have

Group I

selected these components for combination in the manner claimed. In re Kotzab, 217 F.3d 1365, 1371, 55 U.S.P.Q.2d 1313, 1317 (Fed. Cir. 2000) (emphasis added).

A finding of obviousness requires that the art contain something to suggest the desirability of the proposed combination. In re Grabiak, 769 F.2d 729, 732 (Fed. Cir. 1985). **In the absence of such a showing**, there is inadequate support for the position that the proposed modification would *prima facie* have been obvious. *Id.* The absence of such a suggestion to combine is dispositive in an obviousness determination. Gambro Lundia AB v. Baxter Healthcare Corp., 110 F.3d 1573, 1579 (Fed. Cir. 1997) (emphasis added).

When the art in question is relatively simple, the opportunity to judge by hindsight is particularly tempting. Consequently, the tests of whether to combine references need to be applied rigorously. McGinley v. Franklin Sports, Inc., 262 F.3d 1339, 1352 (Fed. Cir. 2001). In each case the factual inquiry whether to combine references must be thorough and searching. *Id.*, at 1352 - 53.

No Substantial Evidence of a Motivation to Modify

Despite the Examiner's allegations, there is no evidence in the record that "both normal price data and minimum acceptable price data for each of a plurality of products is well known" prior to the invention by Appellants. However, even if there were substantial evidence that the prior art disclosed such subject matter, this subject matter would still need to be modified to yield the claimed limitation of *maintaining a database of product data, including normal price data and minimum acceptable price data for each of a plurality of products*.

The Examiner provides no motivation to modify the alleged "well known" feature to yield such a database of product data. The rejection fails for at least these reasons.

No Substantial Evidence of a Motivation to Combine

The Examiner has proposed that one of ordinary skill in the art at the time the invention was made would have combined Piciocccio with the "well known" subject matter (as modified) in order "to insure that the breakeven point is met so that the vending machine is not operating at a loss." Third Office Action, page 3, paragraph (a).

This proposed "motivation" fails for several reasons.

Group I

The motivation "to insure that the breakeven point is met so that the vending machine is not operating at a loss", would not cause one to modify Picioccio in order to offer products which are selected based on, inter alia, a minimum acceptable price.

First, the vending machine of Picioccio (or indeed any other vending machine) does not require such a feature to avoid "operating at a loss". The usual pricing methodology of a vending machine (including Picioccio) is to establish a single price for a product and sell the product for that price. For example, Picioccio discloses that in vending machine products are sold "at a price determined by the operator of the vending machine". Col. 1, lines 21 - 24. Consequently, a customer must "insert coins or currency equaling or exceeding the price of the desired item." Col. 1, lines 24 - 27 (emphasis added). Setting this price high enough easily avoids "operating at a loss".

For this reason, the purported "danger" of operating at a loss is not a concern which is suggested by any reference of record.

In addition, the Examiner's alteration of Picioccio to include "minimum acceptable price data" would not in any way further the proposed motivation of insuring "that the vending machine is not operating at a loss". Picioccio does not suggest that the unit price is in any way variable. If the unit price is not variable, there would be no need for minimum acceptable price data to be used in a manner that insures "that the vending machine is not operating at a loss".

Picioccio is an automatic bulk vending machine in which unit price is fixed. In bulk vending, items such as candy are sold by weight. Col. 1, line 65 - Col. 2, line 4. Price calculation is therefore a straight forward multiplication of weight times unit price. Thus, for example, when the device of Picioccio vends "a predetermined amount of total product at a predetermined price" (Col. 2, lines 37 - 40), it is a straight forward multiplication of weight times unit price. Similarly, when the device of Picioccio allows "the customer to select the amount of overall product desired and to compute the price to be charged" it is a straight forward multiplication of weight times unit price as well.

Thus the Examiner has not shown a motivation in the prior art of record to combine the references in any manner that renders the claims of the Group obvious. The rejection fails for at least this reason.

Group I

1.3.3. Level of Skill

Applicable Law

A factual predicate underlying an obviousness determination is the level of ordinary skill in the art. *In re Rouffet*, 149 F.3d 1350, 1355 (Fed. Cir. 1998). The skill level is one component of the inquiry for a suggestion to combine. *In re Rouffet*, 149 F.3d 1350, 1359 (Fed. Cir. 1998).

Lacking a motivation to combine, there is no prima facie case of obviousness. *In re Rouffet*, 149 F.3d 1350, 1358 (Fed. Cir. 1998). If examination at the initial stage does not produce a prima facie case of unpatentability, then without more the applicant is entitled to grant of the patent. *In re Oetiker*, 977 F.2d 1443, 1445 (Fed. Cir. 1992).

Proposed Factual Findings

Though required to do so, the Examiner has not set forth any evidence relating to the level of ordinary skill in the art, and has not even alleged what the level of skill in the art would be. The rejection fails for at least this reason.

Based on the present record, one could only conclude that the level of skill is low.

1.4. No Prima Facie Showing of Indefiniteness of the Claims of Group I

The Examiner has asserted that three terms in the claims are indefinite and therefore the claims are indefinite. In fact, the rejection is erroneously based on the fact that the claims are broad, and that the claims do not explain the claimed technology or how it works. Accordingly, the rejection is improper.

Applicable Law

"Where the bounds of the claims are indeterminable, the claims are invalid under 35 U.S.C. § 112, P 2, as indefinite." *Personalized Media Communications, LLC v. International Trade Comm'n*, 161 F.3d 696, 705 (Fed. Cir. 1998).

"The requirement that the claims 'particularly point[] out and distinctly claim[]' the invention is met when a person experienced in the field of the invention would understand the scope of the subject matter that is patented when the claim is read in conjunction with the rest of the specification." *S3 Inc. v. nVIDIA Corp.*, 259 F.3d 1364, 1367 (Fed. Cir. 2001).

Group I

"If the claims when read in light of the specification reasonably apprise those skilled in the art of the scope of the invention, § 112 demands no more." Miles Laboratories, Inc. v. Shandon, 997 F.2d 870, 875 (Fed. Cir. 1993).

"The purpose of claims is not to explain the technology or how it works, but to state the legal boundaries of the patent grant. A claim is not 'indefinite' simply because it is hard to understand when viewed without benefit of the specification." S3 Inc. v. nVIDIA Corp., 259 F.3d 1364, 1369 (Fed. Cir. 2001).

Contents of Rejection

The Examiner asserts that three terms are indefinite: "normal price", "minimum" and "acceptable". Third Office Action, page 2, paragraph 3.

Appellants note that the allegation that these terms are indefinite contradicts the Examiner's assertion that "both **normal** price data and **minimum acceptable** price data for each of a plurality of products is well known". Third Office Action, page 3, paragraphs (a) and (c). Thus, the two rejections (for indefiniteness and obviousness) cannot be reconciled.

Appellants also note that the terminology was definite enough for the Examiner to interpret the claims and reject those claims in three Office Actions. The rejection for indefiniteness was not made until the third Office Action, which itself maintained previous rejections over prior art which allegedly could be modified to use normal price data and minimum acceptable price data. Third Office Action, page 3, paragraphs (a) and (c).

Further, the Examiner seems to believe that the terms "normal" and "minimum" are indefinite because the manner of calculating them is not set forth in the claim. Third Office Action, page 2, paragraph 3. However, this is not a proper basis for indefiniteness. "The purpose of claims is not to explain the technology or how it works, but to state the legal boundaries of the patent grant. A claim is not 'indefinite' simply because it is hard to understand when viewed without benefit of the specification." S3 Inc. v. nVIDIA Corp., 259 F.3d 1364, 1369 (Fed. Cir. 2001). Further, the present disclosure makes the meanings of the terms "normal" and "minimum" clear.

Also, the Examiner seems to believe that the term "acceptable" is indefinite because the claim does not set forth to whom the price must be acceptable. Third Office Action, page 2, paragraph 3. However, the breadth of a claim is not to be equated with indefiniteness. *In re Group I*

Miller, 441 F.2d 689 (CCPA 1971), M.P.E.P. 2173.04. The fact that a claim may read on two embodiments does not render the claim indefinite. Further, the present disclosure makes the meaning of the term "acceptable" clear.

In conclusion, the Examiner has not set forth a *prima facie* case of unpatentability of the claims of Group I, none of the references (alone or in combination) disclose or suggest the limitations of the claims of Group I, and none of the references (alone or in combination) possess the advantages conferred by those limitations, as discussed in detail above in Section 1.2 "Advantages of Independent Claim 1". Accordingly, for at least those reasons, the claims of Group I are patentable in view of the cited references.

2. Group II

SEPARATE ARGUMENT OF PATENTABILITY

Group II includes dependent claim 10, which depends from claim 1 (Group I).

The claims of Group II are patentable for the same reasons as Group I. In addition, further arguments of patentability are presented below.

2.1. No Substantial Evidence of the Limitation of Dependent Claim 10

Dependent claim 10 additionally recites the following step:

receiving minimum acceptable price data from an operator

Proposed Factual Findings

In rejecting claim 10, the Examiner admits that Picioccio "does not disclose *minimum acceptable price data*". However, the Examiner tersely states that "this price model is well known". Third Office Action, page 5. Applicants requested support for this and other assertions. Appellants' First Response, pages 9 - 10. Appellants' Second Response, pages 3 - 4. However, no support for the assertions was provided.

These Findings Have No Support in the Record

There is no evidence in the record that any reference or combination of references would suggest *receiving minimum acceptable price data from an operator*. More generally, despite the Examiner's allegation regarding what was well known, there is no evidence that, prior to the invention by Appellants, it was well known to do anything with the minimum acceptable price data, much less *receive minimum acceptable price data from an operator*. Since the Examiner has refused to provide any evidence of this feature, and the rejection of every claim in this Group is based on this "official notice", no prima facie case of obviousness has been made for any claim in this Group.

Group II

3. Group III

SEPARATE ARGUMENT OF PATENTABILITY

Group III includes dependent claim 11, which depends from claim 1 (Group I).

The claims of Group III are patentable for the same reasons as Group I. In addition, further arguments of patentability are presented below.

3.1. No Substantial Evidence of the Limitation of Dependent Claim 11

Dependent claim 11 additionally recites the following:

determining whether the monetary value is at least as great as the lowest minimum acceptable price, and

wherein the step of offering is performed only upon determining that the monetary value is at least as great as the lowest minimum acceptable price

Proposed Factual Findings

In rejecting claim 11, the Examiner contends that Picioccio discloses the additional limitations of claim 11. Third Office Action, page 5.

The Examiner admits that "Picioccio does not explicitly do any price comparison with the lowest minimum acceptable price". However, the Examiner tersely states that "this form of price comparison is well known". Third Office Action, pages 5 - 6. Applicants requested support for this and other assertions. Appellants' First Response, pages 9 - 10. Appellants' Second Response, pages 3 - 4. However, no support for the assertions was provided.

These Findings Have No Support in the Record

The Examiner's statement that Picioccio discloses the entirety of the additional limitations of claim 11 contradicts his admission that Picioccio does not disclose that there is *minimum acceptable price data* for products. Third Office Action, page 3, paragraphs (a) and (c). In fact, Picioccio does not disclose this limitation of claim 11.

Further, there is no evidence in the record that any reference or combination of references would suggest *offering only upon determining* anything, much less the specifically claimed *Group III*

limitation of *offering only upon determining that the monetary value is at least as great as the lowest minimum acceptable price*. More generally, despite the Examiner's allegation regarding what was well known, there is no evidence that, prior to the invention by Appellants, it was well known to do anything with the minimum acceptable price data, much less *receive minimum acceptable price data from an operator*. Since the Examiner has refused to provide any evidence of this feature, and the rejection of every claim in this Group is based on this "official notice", no prima facie case of obviousness has been made for any claim in this Group.

Group III

4. Group IV

SEPARATE ARGUMENT OF PATENTABILITY

Group IV includes dependent claim 17, which depends from claim 16 (Group I).

The claims of Group IV are patentable for the same reasons as Group I. In addition, further arguments of patentability are presented below.

4.1. No Substantial Evidence of the Limitation of Dependent Claim 17

Dependent claim 17 additionally recites the following:

calculating an additional amount, the additional amount being the difference between the second monetary value and the minimum acceptable price of the second product

and

prompting the consumer to supply funds at least equal to the additional amount

Proposed Factual Findings

In rejecting claim 17, the Examiner contends that Picioccio discloses the additional limitations of claim 17. Third Office Action, page 8.

The Examiner admits that "Picioccio does not explicitly teach 'upsell' or the handling of change or refund from the vending machine". However, the Examiner tersely states that "upsell is old and well known in the retail art". Third Office Action, page 8. Applicants requested support for this and other assertions. Appellants' First Response, pages 9 - 10. Appellants' Second Response, pages 3 - 4. However, no support for the assertions was provided.

These Findings Have No Support in the Record

The Examiner's statement that Picioccio discloses the entirety of the additional limitations of claim 17 contradicts his admission that Picioccio does not disclose that there is *minimum acceptable price data* for products. Third Office Action, page 3, paragraphs (a) and (c). In fact, Picioccio does not disclose the limitation of claim 17.

Further, there is no evidence in the record that any reference or combination of references would suggest either *calculating an additional amount* or *prompting the consumer to supply Group IV*

funds at least equal to the additional amount. More generally, despite the Examiner's allegation regarding what was well known, there is no evidence that, prior to the invention by Appellants, it was well known to do anything with the *minimum acceptable price*, much less *calculate an additional amount* based on a *minimum acceptable price*. Since the Examiner has refused to provide any evidence of this feature, and the rejection of every claim in this Group is based on this "official notice", no prima facie case of obviousness has been made for any claim in this Group.

Group IV

5. Group V

SEPARATE ARGUMENT OF PATENTABILITY

Group V includes dependent claim 18, which depends from claim 16 (Group I).

The claims of Group V are patentable for the same reasons as Group I. In addition, further arguments of patentability are presented below.

5.1. No Substantial Evidence of the Limitation of Dependent Claim 18

Dependent claim 18 additionally recites the following:

the database further includes complementary product data for each of the plurality of products

and wherein

the step of selecting [a product to offer] is further based on the first product and the complementary product data for the first product

Proposed Factual Findings

In rejecting claim 18, the Examiner contends that Picioccio discloses the additional limitations of claim 18. Third Office Action, page 9.

The Examiner admits that "Picioccio does not teach complementary products". However, the Examiner tersely states that "complementary products are old and well known in the food retail industry". Third Office Action, page 9. Applicants requested support for this and other assertions. Appellants' First Response, pages 9 - 10. Appellants' Second Response, pages 3 - 4. However, no support for the assertions was provided.

These Findings Have No Support in the Record

The Examiner's statement that Picioccio discloses the entirety of the additional limitations of claim 18 contradicts his admission that Picioccio does not disclose complementary products. Third Office Action, page 9. In fact, Picioccio does not disclose the limitation of claim 18.

Further, there is no evidence in the record that any reference or combination of references would suggest anything to do with complementary products, much less *selecting [a product to Group V*

offer] further based on the first product and the complementary product data for the first product. More generally, despite the Examiner's allegation regarding what was well known, there is no evidence that, prior to the invention by Appellants, it was well known to do anything with *complementary product data*, much less *selecting a product to offer* based on such information. Since the Examiner has refused to provide any evidence of this feature, and the rejection of every claim in this Group is based on this "official notice", no prima facie case of obviousness has been made for any claim in this Group.

CONCLUSION

Thus, the Examiner's rejection of the pending claims are is improper at least because the all pending claims are directed to statutory subject matter. In addition, the references, alone or in combination, do not disclose or suggest all the limitations of any claim. In addition, in the obviousness rejections the Examiner has improperly combined the references because there is no adequate reasoning or support in the prior art for making the proposed combination. Therefore, Appellants respectfully request that the Examiner's rejections be reversed.

If any issues remain, or if there are any further suggestions for expediting allowance of the present application, please contact Dean Alderucci using the information provided below.

Appellants hereby request any extension of time that may be required to make this Appeal Brief timely. Please charge any fees that may be required for this paper, or credit any overpayment, to Deposit Account No. 50-0271.

Respectfully submitted,



Dean Alderucci
Attorney for Appellants
Registration No. 40,484
Walker Digital, LLC
Alderucci@WalkerDigital.com
(203) 461-7337 /voice
(203) 461-7300 /fax

December 8, 2003

Date



APPENDIX A
CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL

Claims 1 - 50 and 52 are pending.

Claims 1, 16, 19, 31, 34, 46, 49, 50 and 52 are independent.

1. A method for selling a product from a vending machine, the product identity being concealed at the time of offer, the method comprising:
 - maintaining a database of product data, including normal price data and minimum acceptable price data for each of a plurality of products;
 - identifying a monetary value available for purchasing a product;
 - selecting a product from among the plurality of products based on the monetary value and the minimum acceptable price data;
 - outputting via an output device an offer of the product to a consumer;
 - determining whether the consumer accepts the offer; and
 - dispensing the product if the consumer accepts the product, thereby revealing the identity of the product to the consumer.
2. The method of claim 1, further comprising receiving the monetary value from the consumer.
3. The method of claim 2, wherein the step of receiving the monetary value includes receiving a credit card account identifier.

CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL

4. The method of claim 2, wherein the step of receiving the monetary value includes receiving a smart card identifier.
5. The method of claim 2, wherein the step of receiving the monetary value includes receiving an electronic representation of currency.
6. The method of claim 1, wherein the database further includes category data for each of the plurality of products, and wherein the step of selecting is further based on the category data.
7. The method of claim 6, further including receiving a category selection from the consumer.
8. The method of claim 1, wherein the step of selecting a product includes selecting a combination of products.
9. The method of claim 1, wherein the step of maintaining includes determining minimum acceptable price data based on sales activity.
10. The method of claim 1, wherein the step of identifying includes receiving minimum acceptable price data from an operator.

11. The method of claim 1, further comprising the step of determining whether the monetary value is at least as great as the lowest minimum acceptable price, and wherein the step of offering is performed only upon determining that the monetary value is at least as great as the lowest minimum acceptable price.

12. The method of claim 1, wherein the step of determining includes providing a predetermined amount of time during which the consumer may refuse to accept the product.

13. The method of claim 1, wherein the database further includes expiration data for each of the plurality of products and wherein the step of selecting is further based on the expiration data.

14. The method of claim 1, wherein the database further includes profitability data for each of the plurality of products and wherein the step of selecting is further based on the profitability data.

15. The method of claim 1, wherein the database further includes demand data for each of the plurality of products and wherein the step of selecting is further based on the demand data.

16. A method for selling a product from a vending machine, the product identity being concealed at the time of offer, the method comprising:

maintaining a database of product data, including normal price data and minimum acceptable price data for each of a plurality of products;

CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL

receiving a first monetary value from a consumer;
receiving a selection of a first product from the consumer;
retrieving a price of the first product from the database of product data;
calculating a second monetary value, the second monetary value being the difference between the first monetary value and the price of the first product.
selecting a second product from among the plurality of products based on the second monetary value and the minimum acceptable price data;
outputting via an output device an offer of the second product to the consumer;
determining whether the consumer accepts the offer; and
dispensing the product if the consumer accepts the product, thereby revealing the identity of the product to the consumer.

17. The method of claim 16, further comprising:

calculating an additional amount, the additional amount being the difference between the second monetary value and the minimum acceptable price of the second product; and
prompting the consumer to supply funds at least equal to the additional amount.

18. The method of claim 16, wherein the database further includes complementary product data for each of the plurality of products and wherein the step of selecting is further based on the first product and the complementary product data for the first product.

19. An automatic sales machine for selling a product, the product identity being concealed at the time of offer, the sales machine comprising:

CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL

a processor;

a memory connected to said processor storing a program to control the operation of said processor;

the processor operative with the program in the memory to:

maintain a database of product data, including normal price data and minimum acceptable price data for each of a plurality of products;

identify a monetary value available for purchasing a product;

select a product from among the plurality of products based on the monetary value and the minimum acceptable price data;

output via an output device an offer of the product to a consumer;

determine whether the consumer accepts the offer; and

dispense the product if the consumer accepts the product, thereby revealing the identity of the product to the consumer.

20. The automatic sales machine of claim 19, wherein the processor is further operative with the program in the memory to determine the monetary value received from the consumer.

21. The automatic sales machine of claim 20, wherein the database further includes category data for each of the plurality of products and wherein the step of selecting is further based on the category data.

22. The automatic sales machine of claim 19, wherein the processor is further operative with the program in the memory to receive a category selection from the consumer.

CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL

23. The automatic sales machine of claim 19, wherein the processor is further operative with the program in the memory to select a combination of products.
24. The automatic sales machine of claim 19, wherein the processor is further operative with the program in the memory to determine minimum acceptable price data based on sales activity.
25. The automatic sales machine of claim 19, wherein the processor is further operative with the program in the memory to receive minimum acceptable price data from an operator.
26. The automatic sales machine of claim 19, wherein the processor is further operative with the program in the memory to determine whether the monetary value is at least as great as the lowest minimum acceptable price, and to offer the product performed only upon determining that the monetary value is at least as great as the lowest minimum acceptable price.
27. The automatic sales machine of claim 19, wherein the processor is further operative with the program in the memory to provide a predetermined amount of time during which the consumer may refuse to accept the product.
28. The automatic sales machine of claim 19, wherein the database further includes expiration data for each of the plurality of products and wherein the processor is further operative with the program in the memory to select the product based on the expiration data.

CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL

29. The automatic sales machine of claim 19, wherein the database further includes profitability data for each of the plurality of products and wherein the processor is further operative with the program in the memory to select the product based on the profitability data.

30. The automatic sales machine of claim 19, wherein the database further includes demand data for each of the plurality of products and wherein the processor is further operative with the program in the memory to select the product based on the demand data.

31. An automatic sales machine for selling a product, the product identity being concealed at the time of offer, the sales machine comprising:

a processor;

a memory connected to said processor storing a program to control the operation of said processor;

the processor operative with the program in the memory to:

maintain a database of product data, including normal price data and minimum acceptable price data for each of a plurality of products;

receive a first monetary value from a consumer;

receive a selection of a first product from the consumer;

retrieve a price of the first product from the database of product data;

calculate a second monetary value, the second monetary value being the difference between the first monetary value and the price of the first product.

select a second product from among the plurality of products based on the second monetary value and the minimum acceptable price data;

CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL

output via an output device an offer of the second product to the consumer;
determine whether the consumer accepts the offer; and
dispense the product if the consumer accepts the product, thereby revealing the
identity of the product to the consumer.

32. The automatic sales machine of claim 31, wherein the processor is further operative with
the program in the memory to:

calculate an additional amount, the additional amount being the difference between the
second monetary value and the minimum acceptable price of the second product; and
prompt the consumer to supply funds at least equal to the additional amount.

33. The automatic sales machine of claim 31, wherein the database further includes
complementary product data for each of the plurality of products and wherein the processor is
further operative with the program in the memory to select the product based on the initial
product and the complementary product data for the initial product.

34. An automatic sales machine for selling a product, the product identity being concealed at
the time of offer, the sales machine comprising:

means for maintaining a database of product data, including normal price data and
minimum acceptable price data for each of a plurality of products;

means for identifying a monetary value available for purchasing a product;

means for selecting a product from among the plurality of products based on the monetary
value and the minimum acceptable price data;

CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL

means for outputting via an output device an offer of the product to a consumer;
means for determining whether the consumer accepts the offer; and
means for dispensing the product if the consumer accepts the product, thereby revealing the identity of the product to the consumer.

35. The automatic sales machine of claim 34, further comprising means for receiving the monetary value from the consumer.

36. The automatic sales machine of claim 34, wherein the database further includes category data for each of the plurality of products and wherein the means for selecting is further based on the category data.

37. The automatic sales machine of claim 34, further comprising means for receiving a category selection from the consumer.

38. The automatic sales machine of claim 34, wherein the means for selecting a product includes means for selecting a combination of products.

39. The automatic sales machine of claim 34, wherein the means for maintaining includes means for determining minimum acceptable price data based on sales activity.

40. The automatic sales machine of claim 34, wherein the means for identifying includes means for receiving minimum acceptable price data from an operator.

CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL

41. The automatic sales machine of claim 34, further comprising means for determining whether the monetary value is at least as great as the lowest minimum acceptable price, and wherein the means for offering is operative only upon determining that the monetary value is at least as great as the lowest minimum acceptable price.

42. The automatic sales machine of claim 34, wherein the means for determining includes means for providing a predetermined amount of time during which the consumer may refuse to accept the product.

43. The automatic sales machine of claim 34, wherein the database further includes expiration data for each of the plurality of products and wherein the means for selecting operates based on the expiration data.

44. The automatic sales machine of claim 34, wherein the database further includes profitability data for each of the plurality of products and wherein the means for selecting operates based on the profitability data.

45. The automatic sales machine of claim 34, wherein the database further includes demand data for each of the plurality of products and wherein the means for selecting operates based on the demand data.

46. An automatic sales machine for selling a product, the product identity being concealed at the time of offer, the sales machine comprising:

means for maintaining a database of product data, including normal price data and minimum acceptable price data for each of a plurality of products;

means for receiving a first monetary value from a consumer;

means for receiving a selection of a first product from the consumer;

means for retrieving a price of the first product from the database of product data;

means for calculating a second monetary value, the second monetary value being the difference between the first monetary value and the price of the first product.

means for selecting a second product from among the plurality of products based on the second monetary value and the minimum acceptable price data;

means for outputting via an output device an offer of the second product to the consumer;

means for determining whether the consumer accepts the offer; and

means for dispensing the product if the consumer accepts the product, thereby revealing the identity of the product to the consumer.

47. The automatic sales machine of claim 46, further comprising:

means for calculating an additional amount, the additional amount being the difference between the monetary value and the minimum acceptable price of the second product; and

means for prompting the consumer to supply funds at least equal to the additional amount.

48. The automatic sales machine of claim 46, wherein the database further includes complementary product data for each of the plurality of products and wherein the means for selecting operates based on the initial product and the complementary product data for the initial product.

49. A computer-readable storage medium encoded with processing instructions for implementing a method for selling a product from a vending machine, the product identity being concealed at the time of offer, the processing instructions for directing a computer to perform the steps of:

maintaining a database of product data, including normal price data and minimum acceptable price data for each of a plurality of products;

identifying a monetary value available for purchasing a product;

selecting a product from among the plurality of products based on the monetary value and the minimum acceptable price data;

outputting via an output device an offer of the product to a consumer;

determining whether the consumer accepts the product; and

dispensing the product if the consumer accepts the product, thereby revealing the identity of the product to the consumer.

50. A computer-readable storage medium encoded with processing instructions for implementing a method for selling a product from a vending machine, the product identity being concealed at the time of offer, the processing instructions for directing a computer to perform the steps of:

CLEAN COPY OF CLAIMS INVOLVED IN THE APPEAL

maintaining a database of product data, including normal price data and minimum acceptable price data for each of a plurality of products;

receiving a first monetary value from a consumer;

receiving a selection of a first product from the consumer;

retrieving a price of the first product from the database of product data;

calculating a second monetary value, the second monetary value being the difference between the first monetary value and the price of the first product.

selecting a second product from among the plurality of products based on the second monetary value and the minimum acceptable price data;

outputting via an output device an offer of the second product to the consumer;

determining whether the consumer accepts the offer; and

dispensing the product if the consumer accepts the product, thereby revealing the identity of the product to the consumer.

52. A method for selling from a vending machine, the method comprising:

receiving currency that represents a first monetary amount;

receiving a selection of a first product;

determining a price of the first product;

determining a demand of the first product;

calculating a second monetary amount based on the difference between the first monetary value and the price of the first product;

selecting a second product from the plurality of products based on the second monetary value and minimum acceptable price data for the plurality of products;

outputting an offer of the selected second product without disclosing the identity of the
selected second product;

receiving an acceptance of the offer; and

dispensing the selected second product.

APPENDIX B
CHART SHOWING CLAIM DEPENDENCIES

Claims 1 - 50 and 52 are pending.

Claims 1, 16, 19, 31, 34, 46, 49, 50 and 52 are independent.

1				
	2			
		3		
		4		
		5		
	6			
		7		
	8			
	9			
	10			
	11			
	12			
	13			
	14			
	15			
16				
	17			
	18			
19				
	20			
		21		
	22			
	23			
	24			
	25			
	26			
	27			
	28			
	29			
	30			
31				
	32			
	33			
34				

CHART SHOWING CLAIM DEPENDENCIES

	35			
	36			
	37			
	38			
	39			
	40			
	41			
	42			
	43			
	44			
	45			
46				
	47			
	48			
49				
50				
52				

CHART SHOWING CLAIM DEPENDENCIES